

Claims

1. Hybrid energy source (H), comprising a fuel cell device (1) and an energy storing device (2), which are directly interconnected in parallel.
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2. Hybrid energy source (H) according to claim 1, wherein the energy storing device (2) comprises a capacitor (22).
3. Hybrid energy source (H) according to one of the previous claims, wherein the energy storing device (2) comprises a battery (21), which is connected to the fuel cell device (1) in a homopolar arrangement.
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4. Hybrid energy source (H) according to claim 3, wherein at least one of the homopolar connections between the fuel cell device (101) and the battery (121) has two branches, wherein
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the first branch is provided for the charging of the battery (121) by the fuel cell device (101) and has a charge limiter to limit the charging, and
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the second branch is connected to an output terminal and contains a device to prevent charging of the battery (121) via the second branch.
5. Hybrid energy source (H) according to one of the previous claims, with a device to prevent an electrolysis current through the fuel cell device.
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6. Hybrid energy source (H) according to one of the claims 3 to 5, wherein the source voltage of the battery (21, 121) in the fully charged state differs by less than 10% from the source voltage of the fuel cell device (1, 101).
- 30 7. Hybrid energy source (H) according to one of the previous claims, with a voltage regulator (R), which converts the terminal voltage (U_K) of the hybrid energy source into a desired output voltage (U_A).

8. Hybrid energy source (H) according to claim 7, wherein the voltage regulator (R) comprises a PWM voltage regulator.

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